

### **Amendments to the Claims**

Please amend the claims as shown below.

1. (Previously Presented) A method for managing intra-day interest calculations for a bank account, comprising:

(a) in response to fluctuations in an account balance of the bank account, setting, by an intra-day interest account management system, balance determination times for the account, the balance determination times corresponding to a plurality of points in time within the span of a single day at which respective net account balances are to be used in an interest calculation for the account;

(b) determining the balances for the account for the balance determination times;

(c) determining applicable conditions for the interest calculation, the conditions relating to an interest rate to be applied based on at least two of a time of day, a calendar day, a variable reference interest rate, an option expiration day, a public holiday in a particular country, a determination whether the net account balance of the bank account is a credit balance, a determination whether the net account balance of the bank account is a debit balance, and a determination whether the bank account has been overdrawn;

(d) providing the account balances and applicable conditions to interest calculation logic; and

(e) recording a result of operations by the interest calculation logic.

2. (Original) The method of claim 1, wherein the balance determination times define intervals of arbitrary length.

3. (Original) The method of claim 1, wherein the balance determination times define intervals of an hour.

4. (Original) The method of claim 1, wherein the balance determination times define intervals of a second.

5. (Original) The method of claim 1, further comprising assigning a value time to a transaction to the account, the value time corresponding to a time when the transaction is included in a balance determination.

6. (Original) The method of claim 5, wherein the value time is specified with an accuracy to the second.

7. (Canceled)

8. (Original) The method of claim 1, wherein based on the conditions, an interest rate used in performing the interest calculation may change from a first time interval to a second time interval.

9. (Previously Presented) A method for managing intra-day interest calculations for a bank account, comprising:

(a) receiving a designation of a bank account to receive intra-day interest calculation;

(b) receiving transaction information for the account, the transaction information including a value time specifying when a transaction is to be taken into account for interest calculation;

(c) receiving a specification of a plurality of points in time for determining corresponding account balances for use in calculating an interest on the bank account, wherein the points of time correspond to a plurality of times within a single day and are determined by an intra-day interest account management system in response to fluctuations in an account balance of the bank account;

(d) for each of the points in time, determining a corresponding account balance, the account balance at a given point in time at least partly depending on the value time;

(e) for each of the points in time, determining an applicable interest rate based on an assigned condition, wherein the assigned condition includes at least two of a time of day, a calendar day, a variable reference interest rate, option expiration day, public holiday in a particular country, a determination whether the net account balance of the bank account is a credit balance, a determination whether the net account balance of the bank account is a debit balance, and a determination whether the bank account has been overdrafted;

(f) providing the account balances and the applicable interest rates to interest calculation logic; and

(g) generating a record of interest amounts calculated by the interest calculation logic.

10. (Previously Presented) The method of claim 9, wherein the value time is specified with an accuracy to the second.

11. (Original) The method of claim 9, wherein (e) comprises referring to an interest calendar that classifies days according to differing interest day types, each type having an interest rate associated therewith.

12. (Previously Presented) A system comprising:

- a memory including computer-executable instructions;

- a processor coupled to the memory to execute the instructions, the instructions comprising:

- in response to fluctuations in an account balance of a bank account, setting, by an intra-day interest account management system, points of time corresponding to a plurality of times within a single day;

- the intra-day interest account management software configured to receive information relating to an intra-day interest calculation, the intra-day interest calculation relating to a calculation of interest on an account for the points of time corresponding to a plurality of times within a single day set by the intra-day interest account management system, the information including:

- transaction information including a value time relating to when a transaction to the account is included in the account balance for interest calculation; and

- conditions applicable to the interest calculation, the conditions relating to interest rates to be applied based on at least two of a time of day, a calendar day, a variable reference interest rate, option expiration day, public holiday in a particular country, a determination whether the net account balance of the bank account is a credit balance, a determination whether the net account balance of the bank account is a debit balance, and a determination whether the bank account has been overdrawn.

13. (Original) The system of claim 12, wherein the intra-day interest account management software is configured to implement a user interface providing for entry of the information.

14. (Original) The system of claim 12, wherein the intra-day interest account management software comprises an interest calendar, the interest calendar classifying days according to differing interest day types, each type having an interest rate associated therewith.

15. (Previously Presented) A system comprising:

a memory including computer-executable instructions;

a processor coupled to the memory to execute the instructions, the instructions when executed implementing a process for managing intra-day interest calculation for a bank account, the instructions comprising:

(a) in response to fluctuations in an account balance of the bank account, setting, by an intra-day interest account management system, balance determination times for the account, the balance determination times corresponding to a plurality of points in time within the span of a single day at which respective net account balances are to be used in an interest calculation for the account;

(b) determining the balances for the account for the balance determination times;

(c) determining applicable conditions for the interest calculation, the conditions relating to an interest rate to be applied based on at least two of a time of day, a calendar day, a variable reference interest rate, option expiration day, public holiday in a particular country, a determination whether the net account balance of the bank account is a credit balance, a determination whether the net account balance of the bank account is a debit balance, and a determination whether the bank account has been overdrawn;

(d) providing the account balances and applicable conditions to interest calculation logic; and

(e) recording a result of operations by the interest calculation logic.

16. (Original) The system of claim 15, wherein the balance determination times wherein the balance determination times define intervals of arbitrary length.

17. (Original) The system of claim 15, the process further comprising assigning a value time to a transaction to the account, the value time corresponding to a time when the transaction is included in a balance determination, wherein the value time is specified with an accuracy to the second.

18. (Previously Presented) A machine-readable medium storing computer-executable instructions for performing a method for managing intra-day interest calculation for a bank account, the method comprising:

(a) in response to fluctuations in an account balance of the bank account, setting, by an intra-day interest account management system, setting balance determination times for the

account, the balance determination times corresponding to a plurality of points in time within the span of a single day at which respective net account balances are to be used in an interest calculation for the account;

(b) determining the balances for the account for the balance determination times;

(c) determining applicable conditions for the interest calculation, the conditions relating to an interest rate to be applied based on at least two of a time of day, a calendar day, a variable reference interest rate, option expiration day, public holiday in a particular country, a determination whether the net account balance of the bank account is a credit balance, a determination whether the net account balance of the bank account is a debit balance, and a determination whether the bank account has been overdrafted;

(d) providing the account balances and applicable conditions to interest calculation logic; and

(e) recording a result of operations by the interest calculation logic.

19. (Original) The machine-readable medium of claim 18, wherein the balance determination times wherein the balance determination times define intervals of arbitrary length.

20. (Previously Presented) A machine-readable medium storing computer-executable instructions for performing a method for managing intra-day interest calculation for a bank account, the method comprising:

(a) receiving a designation of a bank account to receive intra-day interest calculation;

(b) receiving transaction information for the account, the transaction information including a value time specifying when a transaction is to be taken into account for interest calculation;

(c) receiving a specification of a plurality of points in time for determining corresponding account balances for use in calculating an interest on the bank account, wherein the points of time correspond to a plurality of times within a single day and are determined by an intra-day interest account management system in response to fluctuations in an account balance of the bank account;

(d) for each of the points in time, determining a corresponding account balance, the account balance at a given point in time at least partly depending on the value time;

(e) for each of the points in time, determining an applicable interest rate based on an assigned condition, wherein the assigned condition includes at least two of a time of day, a

calendar day, a variable reference interest rate, option expiration day, public holiday in a particular country, a determination whether the net account balance of the bank account is a credit balance, a determination whether the net account balance of the bank account is a debit balance, and a determination whether the bank account has been overdrafted;

(f) providing the account balances and the applicable interest rates to interest calculation logic; and

(g) generating a record of interest amounts calculated by the interest calculation logic.

21. (Previously Presented) The method of claim 1, wherein the plurality of points in time are defined as a plurality of intervals of arbitrary length to time within a single day.

22. (Previously Presented) The method of claim 9, wherein the plurality of points in time are defined as a plurality of intervals of arbitrary length of time within a single day.

23. (Previously Presented) The system of claim 12, wherein the plurality of points in time are defined as a plurality of intervals of arbitrary length of time within a single day.

24. (Previously Presented) The system of claim 15, wherein the plurality of points in time are defined as a plurality of intervals of arbitrary length of time within a single day.

25. (Previously Presented) The machine readable medium of claim 18, wherein the plurality of points in time are defined as a plurality of intervals of arbitrary length to time within a single day.

26. (Previously Presented) The machine readable medium of claim 20, wherein the plurality of points in time are defined as a plurality of intervals of arbitrary length to time within a single day.

27. (New) A method for managing intra-day interest calculations for a bank account, comprising:

(a) in response to fluctuations in an account balance of the bank account, setting, by an intra-day interest account management system, a plurality of balance determination times for the account, each balance determination time corresponding to a point in time within a common calendar day at which respective net account balances are to be used in an intra-day interest calculation for the account;

- (b) determining the balances for the account for the balance determination times;
- (c) determining applicable conditions for the interest calculation, the conditions relating to an interest rate to be applied based on at least two of a time of day, a calendar day, a variable reference interest rate, an option expiration day, a public holiday in a particular country, a determination whether the net account balance of the bank account is a credit balance, a determination whether the net account balance of the bank account is a debit balance, and a determination whether the bank account has been overdrafted;
- (d) providing the account balances and applicable conditions to interest calculation logic;  
and
- (e) recording a result of operations by the interest calculation logic.